December 2005 Update

Smeltertown/Koppers Salida, Colorado (5-Year Review Date: 9/28/2005)

Highlights Since the 2005 5-Year Review

• Maintenance work initiated in May 2006 included removal of shrubs, weeds and sediment from the surface water channel. New riprap was placed inside the north section of the channel and an old silt fence removed.

Brief Site History: The 120 acre site, located in Chaffee County near the Arkansas River, is about one mile northwest of Salida.

From the turn of the century until about 1920 a lead/zinc smelter operated at the site and dumped wastes along the banks of the Arkansas River. Contaminants include arsenic, cadmium, copper, lead, manganese and zinc.

Beginning in 1924 wood treatment occurred at the site. Creosote and pentachlorophenol were allowed to drip onto the ground after the lumber was treated. Creosote contaminated soils were removed in 1986 and 1992.

The site is divided into two Operable Units (OUs): OU1-located in the center of the site, includes the former smelter; OU2-in the western section of the site is where the former wood treating facility was located. A third OU, the former site of CoZinCo, a manufacturer of zinc sulfate soil amendment/animal feed, has been deferred to RCRA for management. OU3 was removed from the site's proposed NPL listing and is not included in the 5-Year Review.

Cleanup Activities: The remedy required the site's central area smelter wastes and contaminated soils to be consolidated along with creosote contaminated soils from the western area under a two-foot soil cover. The entire consolidation area was then revegetated, fertilized and seeded with native perennial grass and plant species suitable for the region. Groundwater wells were installed down gradient for post construction monitoring.

Current Status: Re-seeding, harrowing, fertilizing and chemical weed control of the consolidated waste pile area was completed on May 10, 2006.

Summary of Protectiveness: The remedy as implemented is currently protective of human health and the environment. Contaminated groundwater associated with OU1 and OU2 is not currently used. Soils and smelter wastes containing contaminants above performance standards are isolated from humans through engineering and institutional controls.

Issues Impacting Protectiveness: There is no other information that calls into question the protectiveness of the remedy.

Five-Year Review 2005 Update Table (Review Date 09/28/2005)

Issues	Recommendations / Follow-Up Actions	Follow-Up Actions (Status/Due Date)	Status of Follow-Up Actions 12-05	Responsible Party
1) Institutional Controls on land use in OU1 appear to be in draft form.	Evaluate effectiveness	January 2007	EPA working with property owner to establish final Institutional Controls.	EPA/CDPHE
2) Perimeter fence surrounding OU1 consolidation requires minor repair.	Repair perimeter fence	December 2005	Fence repaired October 2005	Potentially Responsible Party (PRP)
3) Cadmium regularly detected above groundwater performance standard at OU1.	Continue monitoring of groundwater quality trends.	January 2007	EPA evaluating the need for remedy modifications	EPA/CDPHE
4) Detection limit for dibenz(a,h) anthracene is higher than groundwater monitoring performance standard for OU1.	Modify analytical method to achieve required detection limit.	January 2007	EPA evaluating the need for remedy modifications	EPA/CDPHE
5) Maximum Contaminant Levels for arsenic in OU1 revised downwards from 50 ug/L to 10 ug/L effective January 23, 2006.	Revise groundwater performance standards	January 2007	EPA evaluating the need for remedy modifications	EPA/CDPHE

Issues	Recommendations / Follow-Up Actions	Follow-Up Actions (Status/Due Date)	Status of Follow-Up Actions 12-05	Responsible Party
6) Detection limits and analytical suite for groundwater monitoring at OU2 are inconsistent with requirements of the Record Of Decision (ROD) and Remedial Work Plans.	Modify analytical method to achieve required detection limits and add missing chemicals to analytical suite.	January 2007	EPA evaluating the need for remedy modifications	PRP
7) Applicable or Relevant and Appropriate Requirements (ARARs) in lieu of risk-based remedial goals for groundwater are inconsistent between OU1 and OU2	Remedial goals will be evaluated for groundwater for OU1 and OU2.	January 2007	EPA evaluating the need for remedy modifications	EPA/CDPHE
8) Many intake assumptions and toxicity values have been revised by US EPA since completion of the Baseline Risk Assessment.	Assess existing soil chemical data to determine whether remaining contamination poses a health risk above a level of concern.	January 2007	EPA evaluating the need for remedy modifications	EPA/CDPHE
9) The use of a residential scenario for establishing groundwater performance standards is inconsistent with the use of an acceptable risk level for industrial soils.	Evaluate remedial goals for OU1 and OU2.	December 2006	EPA evaluating risk assumptions	EPA/CDPHE